



## STEVAL-ILL002V3

High-brightness LED driver with diagnostics (40 LEDs)  
demonstration board based on the STP08DP05

Data brief

### Features

- Brightness regulation
- Blinking speed regulation
- Animated text
- Error detection on output
- Graphic user interface (GUI)
- DC-DC converter

### Description

This demonstration board provides a complete solution for driving a high-brightness LED array based on the STP08DP05 power logic driver with diagnostics features.

The STP08DP05 is controlled by the ST7FLITE3x 8-bit microcontroller.

Forty high-brightness LEDs are arranged on the board in a 5 x 8 matrix. The matrix is driven by five 8-channel STP08DP05 drivers, and the blue LEDs used are manufactured by OSRAM.

The innovative feature of the STP08DP05 is the full error detection function on outputs so the status of outputs can be checked without invasive tests (using software).



## 1

**Figure 1. Schematic diagram**



## 2 Revision history

**Table 1. Document revision history**

Date	Revision	Changes
11-May-2009	1	Initial release.

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